

## Dielectric Paste for Aluminum base JZ3003X

LEED JZ3003X dielectric pastes are designed to be used together to insulate type 3003 or 3103 aluminum substrates, and non-toxic element up to European RoHS environmental regulation. They match with the TEC of aluminum substrate well. The total dielectric fired thickness must exceed 80 micrometers after printing three layers, the breakdown voltage can achieve 1800VAC, designed for aluminum substrate, heating element for aluminum substrate.

### Paste Data

Solid Content	75±2%
Viscosity (Pa · S) (Brookfield HBT, 25°C, 10rpm)	30~50
Fineness	<15 μ m
Color	green/blue/black/dark gray
Shelf Life (5~20°C)	6 months
Screen (BOPP stainless steel)	145~165 mesh
Drying	infrared stove 200°C/5min
Firing	540~580/10min
Substrate for Calibration	3003 or 3103 aluminum substrate
Thinner	LEED DZXS
Compatible Materials	LEED DT550X, DZ55XX
Fired Thickness	80~100um
Insulation Resistance	>10
Breakdown Voltage (25°C, air)	>1800VAC/80um

#### Notes:

- All properties are target values and are not meant to represent product specifications;
- The viscosity of paste just satisfy to printing, can regulate according requirement of customers;
- Use the LEED recommended thinner for slight adjustments to viscosity or to replace evaporation losses, thinning is not normally required;
- The firing data just for reference, the details can be regulated to achieve the best effect according to the fired thickness and the relationship of series resistance and parallel resistance.

### Recommended Technical Information & Notice

**Printing:** It is recommended the lustration grade of appliance and circumstance to be more than ten thousand degree, it should be guaranteed that the room temperature and appliance temperature remains  $26 \pm 2^\circ\text{C}$  during printing. Keep stir it slowly and fully before using. If take out of from icebox or icehouse firstly, please place it in

the printing house until it return to room temperature , if add the thinner,should stir fully, or will affect performance of pastes.

Drying: It can be dried both in infrared stove and rotary dry furnace, the peak temperature of drying is 250~300 degree centigrade, the drying time can be regulated according drying situation.

Firing: Firing is one of most imporant data for affecting the performance of paste. The best firing temperature should be regulated according the detailed machines so that can obtain the uniform,glossy fired film.

Thinning: JZ3003X composition is optimized for screen printing and thinning is not normally required.Use the LEED recommended thinner for laigh adjustments to viscosity of to replace evaporation losses. The use of too much thinner or the use of a non recommended thinner may affect the rheological behavior of the material and its printing characteristics, and stir fully after thinning.

Compatibility : JZ3003X has good compatibilyes with LEED conductive paste DT550X and resistior paste DZ55XX.

Transportation and Storage: during transportation and storage should protect against the tide and contamination. Containers may be stored in a clean, dry and stable environment at room temperature (between 5°C ~20°C),with their lids tightly sealed.

## **Precautions**

LEED JZ3003X dielectric paste is an environmental insulator material and non-toxic element up to European RoHS regulation and RoHS regulation.Harmful if swallowed inhaled when in use. Avoid contact with eyes, wash thoroughly after handling, and see doctor soon.

## **About LEED Electronic Pastes**

LEED Thick Film Paste Company is one of most researching competitive and economic powful suppliers. Since entered the electronic industry from 2001, to adopt the method of independent research and development and contacting with national university , are the supported project of “863 plans” and National Innovation Fund about electronic paste, developed thick firm paste for stainless steel, palladium silver conductive paste and silver paste, silver paste for vehicle window defogging, ruthenate resistor paste, PTC linear thermistor paste, heat-drying conductive paste and adhesive series products, and established the production and testing line of solar cell, for researching the silicon solar cell aluminium paste, positive electrode paste and back electrode pastek, establish the same product condition and testing method with customers’ . LEED company has a perfect quality system ,got ISO9001 Quality Management System and ISO14001 Environmental Management System.